

8



ENTERED

OIPE

RAW SEQUENCE LISTING

DATE: 06/14/2002 2.7

PATENT APPLICATION: US/10/028,396A

TIME: 15:40:53

Input Set : A:\Substitute Sequence Listing.txt

Output Set: N:\CRF3\06142002\J028396A.raw

3 <110> APPLICANT: VLAAMS INTERUNIVERSITAIR INSTITUUT VOOR BIOTECHNOL

5 <120> TITLE OF INVENTION: Nucleic Acid Binding of Multi-Zinc Finger Transcription

Factors

7 <130> FILE REFERENCE: 2676-5174US

9 <140> CURRENT APPLICATION NUMBER: US/10/028,396A

10 <141> CURRENT FILING DATE: 2001-12-21

12 <150> PRIOR APPLICATION NUMBER: 99202068.5

13 <151> PRIOR FILING DATE: 1999-06-25

15 <150> PRIOR APPLICATION NUMBER: PCT/EP00/05582

16 <151> PRIOR FILING DATE: 2000-06-09

18 <160> NUMBER OF SEQ ID NOS: 49

20 <170> SOFTWARE: PatentIn version 3.1

22 <210> SEQ ID NO: 1

23 <211> LENGTH: 5

24 <212> TYPE: DNA

C--> 25 <213> ORGANISM: Artificial

27 <220> FEATURE:

28 <221> NAME/KEY: misc_feature

29 <223> OTHER INFORMATION: Description of Artificial Sequence: Portion of bait for screening

31 <400> SEQUENCE: 1

32 cacct

5

34 <210> SEQ ID NO: 2

35 <211> LENGTH: 6

36 <212> TYPE: DNA

C--> 37 <213> ORGANISM: Artificial

39 <220> FEATURE:

40 <221> NAME/KEY: misc_feature

41 <223> OTHER INFORMATION: Description of Artificial Sequence: portion of bait for screening

44 <400> SEQUENCE: 2

45 cacctg

6

46 <210> SEQ ID NO: 3

47 <211> LENGTH: 5

48 <212> TYPE: DNA

C--> 49 <213> ORGANISM: Artificial

51 <220> FEATURE:

52 <221> NAME/KEY: misc feature

53 <223> OTHER INFORMATION: Description of Artificial Sequence: portion of bait for screening

55 <400> SEQUENCE: 3

56 aggtg

5

58 <210> SEQ ID NO: 4

59 <211> LENGTH: 7

60 <212> TYPE: DNA
C--> 61 <213> ORGANISM: Artificial
63 <220> FEATURE:

RAW SEQUENCE LISTING

DATE: 06/14/2002

PATENT APPLICATION: US/10/028,396A

TIME: 15:40:53

Input Set: A:\Substitute Sequence Listing.txt

Output Set: N:\CRF3\06142002\J028396A.raw

```

64 <221> NAME/KEY: misc_feature
65 <223> OTHER INFORMATION: Description of Artificial Sequence: consensus element for
binding
66     of MyT1, NZF-1 and NZF-3
68 <400> SEQUENCE: 4
69 aaagttt
71 <210> SEQ ID NO: 5
72 <211> LENGTH: 52
73 <212> TYPE: DNA
C--> 74 <213> ORGANISM: Artificial
76 <220> FEATURE:
77 <221> NAME/KEY: misc_feature
78 <223> OTHER INFORMATION: Description of Artificial Sequence: complex consensus
sequence
80 <220> FEATURE:
81 <221> NAME/KEY: misc_feature
82 <222> LOCATION: (16)..(43)
83 <223> OTHER INFORMATION: nucleotides 16-43 represent a spacer sequence wherein any
one, more,
84     or all of nucleotides 16-43 may be present or absent
86 <400> SEQUENCE: 5
W--> 87 gacaagataa gataannnnnn nnnnnnnnnnn nnnnnnnnnnn nnctcatct tc
91 <210> SEQ ID NO: 6
92 <211> LENGTH: 30
93 <212> TYPE: DNA
C--> 94 <213> ORGANISM: Artificial
96 <220> FEATURE:
97 <221> NAME/KEY: misc_feature
98 <223> OTHER INFORMATION: Description of Artificial Sequence: primer SIP1 NZF3Mut
100 <400> SEQUENCE: 6
101 ccacctgaaa gaatccctga gaattcacag
103 <210> SEQ ID NO: 7
104 <211> LENGTH: 30
105 <212> TYPE: DNA
C--> 106 <213> ORGANISM: Artificial
108 <220> FEATURE:
109 <221> NAME/KEY: misc_feature
110 <223> OTHER INFORMATION: Description of Artificial Sequence: primer SIP1 CZF2Mut
112 <400> SEQUENCE: 7
113 gggtcctaca gttcatctat cagcagcaag
115 <210> SEQ ID NO: 8
116 <211> LENGTH: 30
117 <212> TYPE: DNA
C--> 118 <213> ORGANISM: Artificial
120 <220> FEATURE:
121 <221> NAME/KEY: misc_feature
122 <223> OTHER INFORMATION: Description of Artificial Sequence: primer SIP1 NZF4Mut
124 <400> SEQUENCE: 8
125 caccacctta tcgagtcctc gaggtgtcac
127 <210> SEQ ID NO: 9
128 <211> LENGTH: 30
129 <212> TYPE: DNA

```

RAW SEQUENCE LISTING

DATE: 06/14/2002

PATENT APPLICATION: US/10/028,396A

TIME: 15:40:54

Input Set: A:\Substitute Sequence Listing.txt

Output Set: N:\CRF3\06142002\J028396A.raw

```

C--> 130 <213> ORGANISM: Artificial
      132 <220> FEATURE:
      133 <221> NAME/KEY: misc_feature
      134 <223> OTHER INFORMATION: Description of Artificial Sequence: primer SIP1 CZF3Mut
      136 <400> SEQUENCE: 9
      137 tcctactcgc agtccatgaa tcacaggtac 30
      139 <210> SEQ ID NO: 10
      140 <211> LENGTH: 50
      141 <212> TYPE: DNA
C--> 142 <213> ORGANISM: Artificial
      144 <220> FEATURE:
      145 <221> NAME/KEY: misc_feature
      146 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-WT
      148 <400> SEQUENCE: 10
      149 atccaggcca cctaaaatat agaatgataa agtgaccagg tgtcagttct 50
      151 <210> SEQ ID NO: 11
      152 <211> LENGTH: 50
      153 <212> TYPE: DNA
C--> 154 <213> ORGANISM: Artificial
      156 <220> FEATURE:
      157 <221> NAME/KEY: misc_feature
      158 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-D
      160 <400> SEQUENCE: 11
      161 atccaggcca cctaaaatat agaatgataa agtgaccaga tgtcagttct 50
      163 <210> SEQ ID NO: 12
      164 <211> LENGTH: 23
      165 <212> TYPE: DNA
C--> 166 <213> ORGANISM: Artificial
      168 <220> FEATURE:
      169 <221> NAME/KEY: misc_feature
      170 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-E
      172 <400> SEQUENCE: 12
      173 taaagtgacc aggtgtcagt tct 23
      175 <210> SEQ ID NO: 13
      176 <211> LENGTH: 27
      177 <212> TYPE: DNA
C--> 178 <213> ORGANISM: Artificial
      181 <220> FEATURE:
      182 <221> NAME/KEY: misc_feature
      183 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-F
      185 <400> SEQUENCE: 13
      186 atccaggcca cctaaaatat agaatga 27
      188 <210> SEQ ID NO: 14
      189 <211> LENGTH: 50
      190 <212> TYPE: DNA
C--> 191 <213> ORGANISM: Artificial
      193 <220> FEATURE:
      194 <221> NAME/KEY: misc_feature
      195 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Rdm + Xbra-E

```

RAW SEQUENCE LISTING

DATE: 06/14/2002

PATENT APPLICATION: US/10/028,396A

TIME: 15:40:54

~~Input Set: A:\Substitute Sequence Listing.txt~~

Output Set: N:\CRF3\06142002\J028396A.raw

```

197 <400> SEQUENCE: 14
198 caatttagag tactgtgtac ttgggagtaa agtgaccagg tgtcagttct      50
201 <210> SEQ ID NO: 15
202 <211> LENGTH: 53
203 <212> TYPE: DNA
C--> 204 <213> ORGANISM: Artificial
206 <220> FEATURE:
207 <221> NAME/KEY: misc_feature
208 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-F + AREB6
210 <400> SEQUENCE: 15
211 atccaggcca cctaaaatat agaatgaggc tcagacaggt gtagaattcg gcg      53
213 <210> SEQ ID NO: 16
214 <211> LENGTH: 53
215 <212> TYPE: DNA
C--> 216 <213> ORGANISM: Artificial
218 <220> FEATURE:
219 <221> NAME/KEY: misc_feature
220 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Rdm + AREB6
222 <400> SEQUENCE: 16
223 caatttagag tactgtgtac ttgggagggc tcagacaggt gtagaattcg gcg      53
226 <210> SEQ ID NO: 17
227 <211> LENGTH: 50
228 <212> TYPE: DNA
C--> 229 <213> ORGANISM: Artificial
231 <220> FEATURE:
232 <221> NAME/KEY: misc_feature
233 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-J
235 <400> SEQUENCE: 17
236 gcacaggcca cctaaaatat agaatgataa agtgaccagg tgtcagttct      50
238 <210> SEQ ID NO: 18
239 <211> LENGTH: 50
240 <212> TYPE: DNA
C--> 241 <213> ORGANISM: Artificial
243 <220> FEATURE:
244 <221> NAME/KEY: misc_feature
245 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-K
247 <400> SEQUENCE: 18
248 atcactgcca cctaaaatat agaatgataa agtgaccagg tgtcagttct      50
250 <210> SEQ ID NO: 19
251 <211> LENGTH: 50
252 <212> TYPE: DNA
C--> 253 <213> ORGANISM: Artificial
255 <220> FEATURE:
256 <221> NAME/KEY: misc_feature
257 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-L
259 <400> SEQUENCE: 19
260 atccagtaaa cctaaaatat agaatgataa agtgaccagg tgtcagttct      50
262 <210> SEQ ID NO: 20
263 <211> LENGTH: 50

```

RAW SEQUENCE LISTING

DATE: 06/14/2002

PATENT APPLICATION: US/10/028,396A

TIME: 15:40:54

Input Set: A:\Substitute Sequence Listing.txt

Output Set: N:\CRF3\06142002\J028396A.raw

```

264 <212> TYPE: DNA
C--> 265 <213> ORGANISM: Artificial
267 <220> FEATURE:
268 <221> NAME/KEY: misc_feature
269 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-M
271 <400> SEQUENCE: 20
272 atccaggccc aataaaatat agaatgataa agtgaccagg tgtcagttct 50
274 <210> SEQ ID NO: 21
275 <211> LENGTH: 50
276 <212> TYPE: DNA
C--> 277 <213> ORGANISM: Artificial
279 <220> FEATURE:
280 <221> NAME/KEY: misc_feature
281 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-N
283 <400> SEQUENCE: 21
284 atccaggcca ccgccaatat agaatgataa agtgaccagg tgtcagttct 50
286 <210> SEQ ID NO: 22
287 <211> LENGTH: 50
288 <212> TYPE: DNA
C--> 289 <213> ORGANISM: Artificial
291 <220> FEATURE:
292 <221> NAME/KEY: misc_feature
293 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-O
295 <400> SEQUENCE: 22
296 atccaggcca cctaaccgat agaatgataa agtgaccagg tgtcagttct 50
298 <210> SEQ ID NO: 23
299 <211> LENGTH: 50
300 <212> TYPE: DNA
C--> 301 <213> ORGANISM: Artificial
303 <220> FEATURE:
304 <221> NAME/KEY: misc_feature
305 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-P
307 <400> SEQUENCE: 23
308 atccaggcca cctaaaatcg cgaatgataa agtgaccagg tgtcagttct 50
310 <210> SEQ ID NO: 24
311 <211> LENGTH: 50
312 <212> TYPE: DNA
C--> 313 <213> ORGANISM: Artificial
316 <220> FEATURE:
317 <221> NAME/KEY: misc_feature
318 <223> OTHER INFORMATION: Description of Artificial Sequence: probe Xbra-Q
320 <400> SEQUENCE: 24
321 atccaggcca cctaaaatat atcctgataa agtgaccagg tgtcagttct 50
323 <210> SEQ ID NO: 25
324 <211> LENGTH: 50
325 <212> TYPE: DNA
C--> 326 <213> ORGANISM: Artificial
328 <220> FEATURE:
329 <221> NAME/KEY: misc_feature

```

RAW SEQUENCE LISTING ERROR SUMMARY
PATENT APPLICATION: US/10/028,396A

DATE: 06/14/2002
TIME: 15:40:55

Input Set : A:\Substitute Sequence Listing.txt
Output Set: N:\CRF3\06142002\J028396A.raw

Please Note:

Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:5; N Pos. 16,17,18,19,20,21,22,23,24,25,26,27,28,29,30,31,32,33,34,35

Seq#:5; N Pos. 36,37,38,39,40,41,42,43

Seq#:48; N Pos. 25

Seq#:49; N Pos. 26

Invalid <213> Response:

Use of "Artificial" only as "<213> Organism" response is incomplete,
per 1.823(b) of New Sequence Rules. Valid response is Artificial Sequence.

Seq#:1,2,3,4,5,6,7,8,9,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24,25,26,27

Seq#:28,29,30,31,32,33,34,35,36,37,38,39,40,41,42,43,44,45,46,47,48,49

VERIFICATION SUMMARY

DATE: 06/14/2002

PATENT APPLICATION: US/10/028,396A

TIME: 15:40:55

~~Input Set: A:\Substitute Sequence Listing.txt~~

Output Set: N:\CRF3\06142002\J028396A.raw

L:25 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:1
L:37 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:2
L:49 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:3
L:61 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:4
L:74 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:5
L:87 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5 after pos.:0
L:94 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:6
L:106 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:7
L:118 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:8
L:130 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:9
L:142 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:10
L:154 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:11
L:166 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:12
L:178 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:13
L:191 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:14
L:204 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:15
L:216 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:16
L:229 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:17
L:241 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:18
L:253 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:19
L:265 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:20
L:277 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:21
L:289 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:22
L:301 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:23
L:313 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:24
L:326 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:25
L:338 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:26
L:350 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:27
L:364 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:28
L:376 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:29
L:388 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:30
L:400 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:31
L:412 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:32
L:424 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:33
L:436 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:34
L:448 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:35
L:461 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:36
L:473 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:37
L:485 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:38
L:497 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:39
L:511 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:40
L:525 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:41
L:539 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:42
~~L:552 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:43~~
L:565 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:44
L:578 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:45
L:589 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:46
~~L:601 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:47~~

VERIFICATION SUMMARY

DATE: 06/14/2002

PATENT APPLICATION: US/10/028,396A

TIME: 15:40:55

~~Input Set: A:\Substitute Sequence Listing.txt~~

Output Set: N:\CRF3\06142002\J028396A.raw

L:613 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:48

L:626 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:48 after pos.:0

L:634 M:220 C: Keyword misspelled or invalid format, <213> ORGANISM for SEQ ID#:49

L:646 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:49 after pos.:0